The Next Level Newsletter - May 2023 - Volume XX, Issue III

Dear Marty,

Our latest article, below the clinic and race information, covers how to improve your running endurance and speed.

Open Water Swim Clinics - **next is tomorrow, May 20 - 8:00 AM**
June 17
July 29
Jordan Lake | 8:00AM - 11:00 AM
3 hour clinic covering everything you need to know about open water training and racing. Include lectures and in-water skills practice and optional practice courses.

Read the details and **sign up here**.

Lightning Squad Youth Triathlon Summer Training - late June to late August | Cary | 2x weekly
The squad is for kids 7-14 and will prepare them for a end of summer kids triathlon. Twice weekly coach-led practices held on Thursday and Sunday afternoons on local greenways and park areas.

Read the details regarding our current spring session and **sign up here**.

Triangle OWS Championship, aka the Hurricane Swim - September 23 | Vista Point, JL | 8:00 AM
1k, 1 mile and 2 mile options. Prices go up August 23. **Sign up here**.

Good running workouts
Once you've established a baseline of run fitness with several months of consistent running, it's time to start running with purpose. Running comes down to a couple of basic principles: How long can an athlete run before tiring (aerobic improvement), and how long can an athlete run fast (Re: at x goal pace) before slowing down.

Given that the athlete is healthy and has no injuries, the first principle is addressed through workouts based on increasing endurance through improving physiological adaptation to running. In other words, by increasing the duration of long runs or frequency of total weekly runs at an easy to comfortable pace, an athlete's body will make physical adaptations that improve his or her ability to continue running at that pace and others while prolonging the onset of fatigue.

An important point here is that these runs should be done primarily at what is called

ventilatory threshold 1 (VT1), which is the point at which a runner's breathing rate is increased but comfortable/steady. This point is higher in fit vs unfit individuals, but is lower than many people run their easy runs at. On a 1-10 effort scale it's around 3-4.

So, progressing the long run over by 10% or so every week and dropping back every 3rd or 4th week, while maintaining this effort level independent of pace is crucial to overall run development. These workouts are sometimes referred to as long slow distance (LSD). This is a keystone of long term runner health and progression. These workouts allow athlete's muscles to improve blood flow and strength, increase mitochondria density, tendons and ligaments to grow stronger, heart to improve circulation, and ability to clear (reabsorb) blood lactate improve.

An example here for a half-marathon athlete would be to do a long run structure (on each Saturday) of something like 8 miles, 9, 10, 9, 10, 11, 10, 11, 12. This would be in the earlier part of the season so all these runs could / should be done at VT1 or close to it.

The second principle is addressed through workouts that are under / at / over the second threshold, which is ventilatory threshold 2 (VT2). This value is usually very close or exact to the blood lactate threshold (LT), and while the terms can be used interchangeably, they're not exactly the same. At this point your body is producing more lactate than it can remove through absorption or exhalation, and it begins to accumulate. This point is higher in fit vs unfit individuals and fit individuals should be able to hold this effort level for up to 1 hour.

In the 7 heart rate zone model, for most athletes VT1 is the top of zone 1 to bottom-mid of zone 2, while VT2/LT is at the very top of zone 4.

Workouts that use intervals, fartlek or progression efforts into the VT2/LT range help an athlete to mentally withstand discomfort at pace, recruit additional muscle fiber types (type I and IIa), improve lactate clearance, and ultimately increase or push out the LT point, closer to V02max.

In other words, running fast is good! But it can't be done all the time and should be done with specific thought within a week's training structure.

A good example of this is 3 or 4 by 1 mile intervals after a good 20-30 minute warm up + plyometrics. This workout could vary in effort level from below VT2 to above VT2 depending on the athlete, overall goal, and point within the season. In the early season the miles could be run at 5-10 bpm below LT with 2-3 minutes jog in between - while fitness is improving and adapting to effort. Later season they could be run at or 5-10 bpm above LT with 1-2 minutes jog in between - when fitness is peaking before a goal event.

Back to the long run - at some point in the season some athletes will want to start spending some time within these runs at higher effort levels, especially our very fit athletes. At this point the assumption is that aerobic fitness is well developed and the athlete is able to do a couple VT1 workouts at other points within the week. Progression runs and longer fartlek runs are good.

A progression run starts easy and then builds the last 20-30 minutes to either a specific pace target or into a sub-threshold (VT2) range. A workout like this would then be maintaining the aerobic improvement principle while also challenging the 'running fast' principle.

Fartlek running would be going back and forth between the 2 ranges. For example, after warming up the athlete would run somewhere between 10-20 minutes at goal pace or some target below VT2, then 5-10 minutes at / near VT1. 3 or 4 rounds of this would make for an entertaining 2 hour run!

Note that well trained individuals can hold the VT1 effort for only about 2 hours. So if you're training for a marathon, most of us non-elite runners will benefit much more from just working on the endurance principle. Athletes training for 5k-10k distances will see more specific benefit from the lactate threshold workouts. That being said, doing more than 20-25% of your overall weekly run volume at high intensity increases the risk of injury or overtraining.

So if you increase your running mileage, chances are most of that increase should be on the

easy/comfortable side. :)

Swivel Bottle
A former OSB athlete has come out with a really neat running bottle that separately holds 2 drinks. You can see the bottle and place an order here! Use code OSB10 for 10% off.

Jamie M top female Master and 5th OA at Texasman Triathlon

Hank C crushes another Spartan race
Chris M takes 2nd AG at Crystal Coast Half
Coach Marty 3rd AG at Crystal Coast Half
"retired" OSB'er Tom L wins Crystal Coast Tri

Allen J 14th AG at the NC Spring Classic 16k
Joanne P 2nd AG at Jordan Lake 1.2 miler
Megan M 1st AG at Jordan Lake 1.2 miler
Chris M top master at Jordan Lake 1.2 miler

Ariel A qualifies for Ironman World Champs at IM Texas

Jamie D takes 8th AG in the Supersprint and 6th AG in the Aquathlon at USAT Multisport Festival
Joanne P takes 12th AG in the Supersprint and 3rd AG in the Duathlon at USAT Multisport Festival
Megan M takes 1st AG at Beaverdam Olympic Tri
Coach Marty 3rd OA at Beaverdam Sprint Tri

Hank C runs the Spartan Charlotte race
Allen J races Pinehurst Intl triathlon

The Summer Lightning Squad youth triathlon training program will start back end of June, 2023, with an 8 week program finishing with a late summer youth triathlon.

Our workouts will generally be between the Raleigh NC State area to the Cary/Morrisville area. Locations will change week to week based on best use. We will send a detailed schedule at the beginning of each week.

Practices will take place on Thursdays 500-600pm and Sundays 400-500pm, unless otherwise noted in the weekly email.

Coaches Marty and Bri Gaal will be working together to run the 8th season if this popular youth program.

Practices will include greenway riding, greenway running, swim workouts, trail hikes, and running/fun games. We use a variety of locations and change the routine to keep things interesting. Please continue reading below for more details.

Lightning Squad youth training program

TRIANGLE OPEN WATER MILE SWIM SERIES

Set your calendar up! We will host two open water swims in 2023.

April 29 - Jordan Lake Open Water Challenge
1k, 1.2m, 2.4m options

September 23 - Hurricane Championship swim
1k, 1m, 2m options

Both events will be held at Vista Point on Jordan Lake. Sign up here.

One Step Beyond offers customized individual endurance training programs to triathletes, runners, and swimmers throughout the year. Our most popular ongoing program is called Basic Steps coaching.

If you want a great schedule but don't feel the need for extensive personal training during the program cycle, this is the plan for you. Our coaches will create a professional training plan designed around your specific goals and constraints, with adjustments along the way as needed. We use heart rate, power, and perceived exertion targets as appropriate.

Your coach will be available to you via email, text, and phone, which we check and respond to Monday thru Friday.

The initial interview is conducted by phone, and all ongoing coaching is accomplished through Training Peaks software, email and phone support. You will receive:

- Annual Training Plan
- A weekly schedule with specific daily workouts
- Weekly group training sessions
- Ongoing email support for all questions (client initiated)
- Ongoing phone support (<15 minute type conversations)
- Race day pacing and nutrition advice
- Necessary adjustments of your schedule
- Regular feedback from your coach
- 20% discount on additional personal training and consulting sessions
- A premium Trainingpeaks training account

Please RSVP if you plan to show up to a training session. Our typical week looks mostly like this. New athletes are welcome!

Bri - brianne@osbmultisport.com

Daniel - daniel@osbmultisport.com
Marty - marty@osbmultisport.com

Day/Time | Location | Workout | Coach

Monday or Tuesday | Online | Core strength training
500 PM

Wednesday | Various gravel locations | 1.5hr ride | Marty
930 or 945 AM

Thursday | Old Reedy Creek entrance to Umstead | Interval run | Bri / Daniel
630 AM

Saturday | Soft surface somewhere | Long run | Bri or Marty
Varies

Sunday | Varies | 30+ mile ride | Bri or Marty
Varies

Come join us!

If you're not quite ready for full time coaching, but need some structured guidance, check out the OSB premade plans below:

Intermediate 16 week Half-Ironman 70.3 Triathlon Training Plan - $79.99
Intermediate 16 week olympic distance triathlon training plan - $69.95
Intermediate 10 week olympic distance triathlon training plan - $59.95
Intermediate 10 week sprint triathlon training plan - $59.95

Beginner Level 2 16 week Half-Ironman 70.3 Triathlon Training Plan - $79.99
Beginner 16 week sprint triathlon triathlon training plan - $69.95
Beginner 16 week olympic distance triathlon training plan - $69.95
Beginner 10 week olympic distance triathlon training plan - 49.95

Beginner 10k run in 10 weeks training program - $44.99

All the programs are hosted on TrainingPeaks. Each program comes with a free basic account. You can check out the details here.

Swivel Bottle

The patented Swivel Bottle is a dual-beverage container with 360 degrees of rotation. Each bottle reservoir holds 8 ounces of fluid.
To use, simply rotate the bottle by spinning the bottle in the palm of your hand to select your drink of choice. Grab a drink by squeezing the bottle, and the liquid squirts out of a leak-proof one-way nozzle.

With a flick of the wrist, you can then rotate the Swivel Bottle 180°, allowing you to drink from the other bottle reservoir. The different color reservoirs makes it easy to remember the different fluids you are carrying.

www.swivelbottle.com

Boone/Beach Mountain area rental from Coach Daniel

We can offer the OSB crew/people a friends and family discount. Contact Coach Daniel through the VRBO link below.

Here is the **VRBO link** if you are interested!

Quote of the month:

Remember, the feeling you get from a good run is far better than the feeling you get from sitting around wishing you were running. -Sarah Condor

www.osbmultisport.com

One Step Beyond | Morrisville, NC | www.osbmultisport.com